(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization International Bureau

William Burous



16 DEC 21 9

1 (1911) | 1011) | 17 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) | 18 (1911) |

(43) International Publication Date 31 December 2003 (31.12.2003)

PCT

(10) International Publication Number WO 2004/000241 A1

(51) International Patent Classification⁷: C04B 28/06

A61K 6/06,

English

(21) International Application Number:

PCT/SE2003/000956

(22) International Filing Date: 11 June 2003 (11.06.2003)

(25) Filing Language: English

...,

(30) Priority Data: 0201918-0 20 June 2002 (

20 June 2002 (20.06.2002) SE

- (71) Applicant (for all designated States except US): DOXA AKTIEBOLAG [SE/SE]; Axel Johanssons Gata 4-6, Kristallen, S-754 51 Uppsala (SE).
- (72) Inventors; and

(26) Publication Language:

- (75) Inventors/Applicants (for US only): HERMANSSON, Leif [SE/SE]; Stenbrohultsvägen 20, 3 tr, S-757 58 Upp-sala (SE). ENGQVIST, Håkan [SE/SE]; Margaretavägen 12, S-741 44 Knivsta (SE).
- (74) Agents: KYLIN, Peter et al.; Hynell Patenttjänst AB, Patron Carls väg 2, S-683 40 Hagfors/Uddeholm (SE).

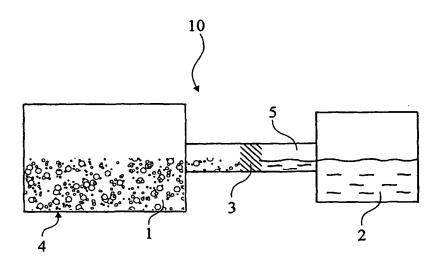
- (81) Designated States (national): AE, AG, AL, AM, AT (utility model), AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ (utility model), CZ, DE (utility model), DE, DK (utility model), DK, DM, DZ, EC, EE (utility model), EE, ES, FI (utility model), FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK (utility model), SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.
- (84) Designated States (regional): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

with international search report

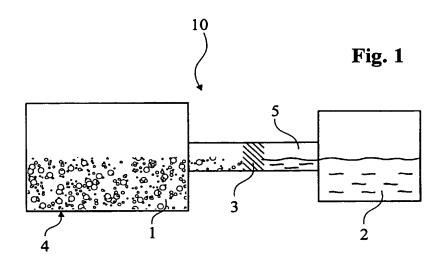
For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: POWDERED MATERIAL, METHOD OF MANUFACTURING IT, RAW COMPACT OF THE POWDERED MATERIAL AND DEVICE FOR THE POWDERED MATERIAL



(57) Abstract: A powdered material, the binder phase of which consisting of a cement-based system that has the capacity following saturation with a liquid reacting with the binder phase to hydrate to a chemically bonded ceramic material. According to the invention, the powdered material exists in the form of granules of powder particles, which granules exhibit a degree of compaction above 55 % and a mean size of 30 - 250 µm. The invention also relates to a raw compact of the powdered material and a method in connection with the manufacturing of a ceramic material from a powdered material. The invention also relates to a device for the powdered material.

2004/000241 A1 ||||



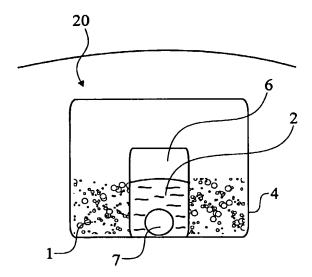


Fig. 2

and the second

A. CLASSIFICATION OF SUBJECT MATTER IPC7: A61K 6/06, C04B 28/06 According to International Patent Classification (IPC) or to both national classification and IPC **B. FIELDS SEARCHED** Minimum documentation searched (classification system followed by classification symbols) IPC7: A61K, C04B Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched SE.DK.FI.NO classes as above Electronic data base consulted during the international search (name of data base and, where practicable, search terms used) C. DOCUMENTS CONSIDERED TO BE RELEVANT Relevant to claim No. Citation of document, with indication, where appropriate, of the relevant passages Category* 1-23 WO 0021489 A1 (DOXA CERTEX AKTIEBOLAG), A 20 April 2000 (20.04.00) 1-23 WO 0176534 A1 (DOXA CERTEX AKTIEBOLAG), A 18 October 2001 (18.10.01) WO 0176535 A1 (DOXA CERTEX AKTIEBOLAG), 1-23 Α 18 October 2001 (18.10.01) Further documents are listed in the continuation of Box C. See patent family annex. "T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention Special categories of cited documents: "A" document defining the general state of the art which is not considered to be of particular relevance earlier application or patent but published on or after the international "X" document of particular relevance: the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone filing date document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) "Y" document of particular relevance: the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art "O" document referring to an oral disclosure, use, exhibition or other document published prior to the international filing date but later than "&" document member of the same patent family the priority date claimed Date of the actual completion of the international search Date of mailing of the international search report **2 3 -09- 2003**

Authorized officer

Jack Hedlund/Els

Telephone No. +46 8 782 25 00

Box 5055, S-102 42 STOCKHOLM

Facsimile No. +46 8 666 02 86

Name and mailing address of the ISA/

<u> 23 Sept 2003</u>

Swedish Patent Office

26/07/03

Internations opplication No.
PCT/SE 03/00956

Patent document cited in search report			Publication date	Patent family member(s)		Publication date
WO	0021489	A1	20/04/00	AU	1305300 A	01/05/00
	••••			BR	9914430 A	26/06/01
				CA	2342584 A	20/04/00
				CN	1109536 B	28/05/03
				CN	1323188 T	21/11/01
				EP	1121087 A	08/08/01
				HU	0103371 A	28/12/01
				JP	2002527366 T	27/08/02
				NO	20011848 A	12/06/01
				SE	514686 C	02/04/01
				SE	9803502 A	13/04/00
WO	0176534	A1	18/10/01	AU	4701901 A	23/10/01
				AU	6035400 A	09/01/01
				BR	0109839 A	03/06/03
				CA	2405016 A	18/10/01
				CN	1422141 T	04/06/03
				EP	1204891 A	15/05/02
				EP	1272145 A	08/01/03
				JP	2003502709 T	21/01/03
				NO	20024863 A	11/12/02
				SE	516264 C	10/12/01
				SE	0001321 A	12/10/01
				US	6570140 B	27/05/03
				US	2002088796 A	11/07/02
WO	0176535	A1	18/10/01	AU	4702001 A	23/10/01
				AU	6035500 A	09/01/01
				BR	0109842 A	03/06/03
				CA	2374357 A	28/12/00
				CA	2405028 A	18/10/01
			•	EP	1205030 A	15/05/02
				EP	1272146 A	08/01/03
				JP	2003502979 T	21/01/03
	•			NO	20024862 A	11/12/02
				SE	516263 C	10/12/01
				SE	0001322 A	12/10/01